



## 12 GeV Upgrade VARIANCE ANALYSIS REPORT

**WBS: 1.4 - Construction Upgrade Hall A, B & C**  
**Control Account Manager: G. Young**  
**For Period Ending: Sep 13**

12 GeV 1.4	SCHEDULE FLAG				COST FLAG			
	(A)	(B)	(B-A)	(B/A)	(C)	(D)	(C-D)	(C/D)
	Planned Value	Earned Value	Schedule Variance	Schedule Perform Index	Earned Value	Actual Cost	Cost Variance	Cost Perform Index
	BCWS	BCWP	SV	SPI	BCWP	ACWP	CV	CPI
Month of Sep-13	1848	2612	764	1.41	2612	2871	-258	0.91
Cumulative	1848	2612	764	1.41	2612	2871	-258	0.91

**Yellow Flag: Index <.9 / >1.1 AND Variance > \$50K**  
**Red Flag: Index <.8 / >1.2 AND Variance > \$100K**

### 1. Cause (Address Variances Individually)

**SV:** The schedule variance is positive and due to a number of items completed early in the rebaseline. Key items are detector work in Hall B (\$122K of early items on SVT, drift chamber and FTOF), completion of design and contract steps for the Hall B Torus (\$91K), partial completion early of the B Solenoid FDR (\$167K) and completion and shipping of conductor for the Torus (\$142K). The Hall CHB magnet completed some helium vessel work early (\$83K) and Hall D had early completion of some TOF items (\$29K) and computing controllers (\$48K). The installation effort in Hall's B (\$42K) and C (\$92K) were ahead of schedule due to early completion of steel support structure work.

### 2. Proposed Solutions (Corrective Actions)

**SV:** No immediate correctives needed since SV is positive. However continuing to progress during much of the next year depends on performance in magnet construction WBSs, which are the subject of much ongoing effort, discussions with magnet vendors to make key technical choices and proceed, and efforts to augment staff.

Estimated Resolution By (Date): NA

### 3. Impact on Project Cost/ Schedules

Schedule Variance Projection					
Oct	Nov	Dec	Jan	Feb	Mar
750	650				

### 4. Comments

All the WBS activities with significant positive SV had been near progress milestones prior to implementation of the rebaseline. As such, this unusually large positive monthly SV is not likely to repeat, and the rebaseline schedule is expected to catch up to the claimed progress over the next 6 months. A possible means to maintain positive SV would be better performance on magnet contacts than has been the case to date.

**Control Account Manager:**  
G. R. Young

**Project Manager:**  
D. Miner for C. Rode